

Work Order ID 55132

January 6, 2010 3:50:15 PM



Page 1

Item ID: D212-664-101

Accept

Setup Start



Revision ID:

Stop



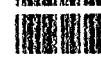
Item Name: Crosstube Fwd

Start Date: 07/01/2010 Start Qty: 1.00



Last Item ID:

Required Date: 28/01/2010 Req'd Qty: 1.00



Customer:

Reference:

Run Start

Approvals: Process Plan: *BT*

Date: 10-1-06

Tooling:

Date:

Stop



QC:

Date:

SPC (Y/N):

Date:

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Draw Number	Draw Rev.	Plan Code	Accept Qty	Reject Qty	Reject Number	Inspe. Stamp
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Draw Nbr	Revision Nbr
D212-664-141	Rev D

100 *10-01-26*

DOCUMENT CONTROL

DC *10-01-26*Document Control *10-01-26**5/10/05*110 *10-01-26* Pick Kit *10-01-26*Packaging *10-01-26*Packaging *10-01-26*120 *10-01-26* BENDING MACHINE - CROSSTUBES *10-01-26*CNC Bend 2 *10-01-26*CNC Alpha 160 Bender *10-01-26*Memo *10-01-26*Bend tube as per Dwg D212-664-141 using CNC bender program 212-fw and *10-01-26*

Folio FT015

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
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NOTE: Date & initial all entries

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Page 2

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Item Name: Crosstube Fwd

Setup Start



Stop



Start Date: 07/01/2010 Start Qty: 1.00



Cust Item ID:

Required Date: 28/01/2010 Req'd Qty: 1.00



Customer:

Reference:

Approvals:

Process Plan:

Date:

Tooling:

Date:

Run

Start



Stop



QC:

Date:

SPC (Y/N):

Date:

Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run HoursDraw
NumberDraw
Rev.Plan
CodeAccept
QtyReject
QtyReject
NumberInsp.
Stamp

130

QC15- Crosstube Dimensional Check

0.00

=> 81011126

0.00



QC

Memo

Quality Control

140



Crosstubes

0.00

Crosstubes

Memo

0.00

Crosstubes

1-Drill pilot holes in tube as per Dwg D212-664-141 using drill Jig DT8548 & DT8549

2-Ream hole to finish size in tube as per Dwg D212-664-141 using drill Jig DT8548 & DT8549. Check dimensions between holes, both sides on both cuffs, to ensure alignment with saddle holes.

3-Scribe part # and batch # using vibrating stylus as per Dwg D212-664-141

4-Deburr & Inspect for surface damage. Repair damage within limits as per Dwg D212-664-141

MB
10/21/2012

Am 10-127

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

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Run

Start



QC:

Date:

SPC (Y/N):

Date:

Stop

Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run HoursDraw
NumberDraw
Rev.Plan
CodeAccept
QtyReject
QtyReject
NumberInsp.
Stamp

180

Receive & Inspect for Damage & Mat'l Certs

0.00



Packaging

Packaging

Memo

0.00

Packaging

Ensure copy of NDT results attached to work order.

1/2/10 (1)

190

QC5- Inspect part completeness to step on W/O

0.00



QC

Quality Control

Memo

0.00

Inspect for damage & ensure results are as per Dwg D212-664-141

10 02 02 (1)

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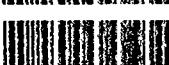
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Date:

Run Start



QC:

Date:

SPC (Y/N):

Date:

Stop

Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run HoursDraw
NumberDraw
Rev.Plan
CodeAccept
QtyReject
QtyReject
NumberInspec.
Stamp

250

QC4- 100% Inspect kits for completeness

0.00

S10/02/05

QC

Memo

0.00

Quality Control

260

Packaging

0.00

R14/2/08 Q

Packaging

Memo

0.00

Packaging

Identify and pack for shipping as per PPP D212-664-101

REV. R

270

QC21- Final Inspection - Work Order Release

0.00

10/02/09 HJ

QC

Memo

0.00

Quality Control

MF 10-2-08

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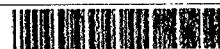
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Picklist Print

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January 6, 2010 3:50:20 PM

Work Order ID: 55132



Parent Item: D212-664-101



Parent Item Name: Crosstube Fwd

Start Date: 07/01/2010

Required Date: 28/01/2010

Comments: IPP RevH: as per ECN09-696 09.11.19 DD verified by:EC

Start Qty: 1.00

Required Qty: 1.00

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	zin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Remaining Qty To Pick	Qty Issued	Date Issued	Status
MS21920-25		Purchased	No			220	Each	193.0000	4.0000			

Clamp(per MIL-DTL-8783C)

Warehouse Location	Loc Qty	Loc Code	W/ 10/02/03
ST	193		
107456	2		
108111	3		
108975	17		
109181	42		
109644	10		
111282	4		
111429	1		
112495	14		
<u>112919</u>	25		
113281	25		
113282	50		

W/O:		WORK ORDER CHANGES					
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Parent Item: D212-664-101



Parent Item Name: Crosstube Fwd

Start Date: 07/01/2010

Required Date: 28/01/2010

Comments: IPP RevH: as per ECN09-696 09.11.19 DD verified by:EC

Start Qty: 1.00

Required Qty: 1.00

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	On Hand	Remaining Qty To Pick	Qty Issued	Date Issued	Status
D2893-1		Manufactured	No			220	Each	67.0000	2.0000			

2.75 Support

WarehouseLocation

Main Warehouse

ST	67
25657	6
47109	2
<u>47637</u>	11
51775	19
53125	19
53340	10

D3428-1

Manufactured No

240

Each

9.0000 1.0000



10-2-4

SF

WarehouseLocation

Main Warehouse

ST096	9
50790	9

S
Placard

W/O:		WORK ORDER CHANGES					
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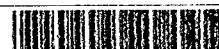
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Start Date: 07/01/2010

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Comments: IPP RevU: as per ECN09-696 09.11.19 DD verified by:EC

Start Qty: 1.00

Required Qty: 1.00

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Remaining Qty To Pick	Qty Issued	Date Issued	Status
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AN6-35A		Purchased	No		240	Each	80.0000	4.0000			10-2-4 SF
---------	--	-----------	----	--	-----	------	---------	--------	--	--	-----------

BOLT

Warehouse	Loc Qty	Loc Code
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Location

Main Warehouse

ST	80	4
112314	30	
112805	20	
113422	30	

AN6-36A		Purchased	No		240	Each	115.0000	4.0000			10-2-4 SF
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Bolt

Warehouse	Loc Qty	Loc Code
-----------	---------	----------

Location

Main Warehouse

ST	115	
109632	1	
110382	2	
112314	62	
113121	50	

W/O:		WORK ORDER CHANGES					
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Picklist Print

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January 6, 2010 3:50:20 PM

Work Order ID: 55132



Parent Item: D212-664-101



Parent Item Name: Crosstube Fwd

Start Date: 07/01/2010

Required Date: 28/01/2010

Comments: IPP RevH: as per ECN09-696 09.11.19 DD verified by:EC

Start Qty: 1.00

Required Qty: 1.00

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Execute Seq ID	Unit of Measure	Qty on Hand	Remaining Qty To Pick	Qty Issued	Date Issued	Status
---------------------------------	---------------------	------------	----------	------------------	---------------	----------------	-----------------	-------------	-----------------------	------------	-------------	--------

MS21042L6

Purchased

No

240

Each

484.0000 6.0000



10-2-4 SF

8

Nut

Warehouse Loc Qty Loc CodeLocation

Main Warehouse

ST	484	
105077	22	
110002	5	
111548	8	
111578	400	6
112492	49	

AN960JD616

Purchased

No

240

Each

669.0000 18.0000



10-2-4 SF

8

Washer

Warehouse Loc Qty Loc CodeLocation

Main Warehouse

ST	669	
112314	3	
112828	366	18
113149	300	

W/O:		WORK ORDER CHANGES					
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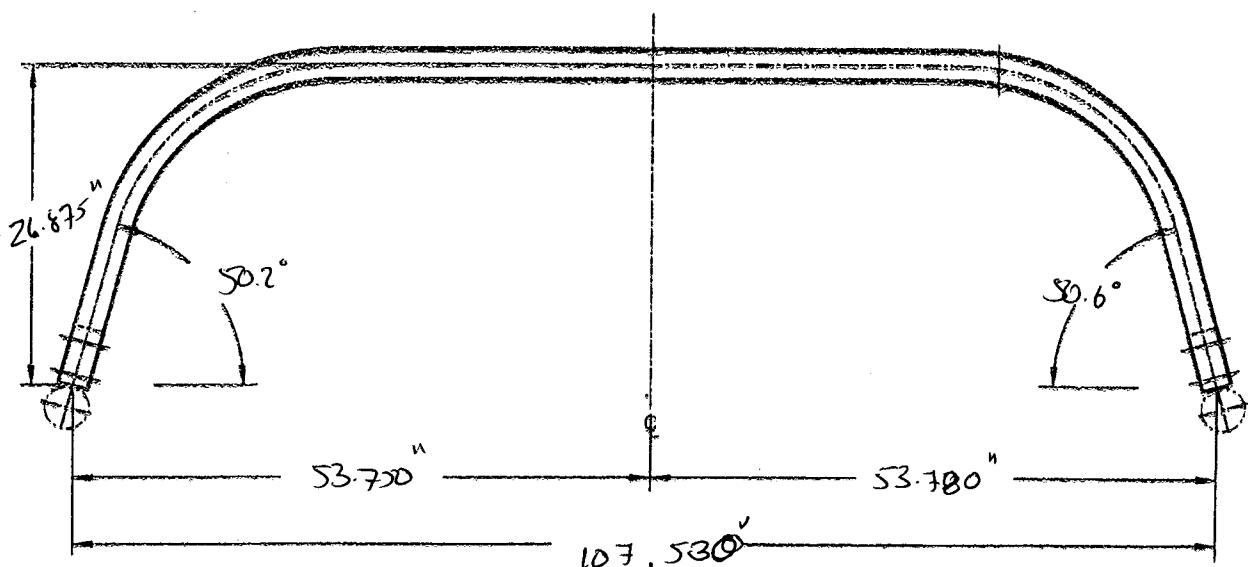
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BART AEROSPACE LTD	Work Order:	55132
Description: Crosstube High Fwd (206/212/412)	Part Number:	D212-664-101
Inspection Dwg: D212-664-141	Rev: <input checked="" type="checkbox"/> D	Page 1 of 1

R 10.01.26

Required Dimension	Min	Max
Height	26.79	27.05
1/2 Span	53.59	53.86
Angle	49	52
Total Span	107.18	107.7



Comments

QC15 Inspection	S
Date	10/01/26

Rev	Date	Change	Revised by	Approved
A	07.02.06	New Issue	KJ/JM	<input checked="" type="checkbox"/>
B	07.05.31	Dimensions updated per Dwg Rev C	KJ/JM	<input checked="" type="checkbox"/>

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D

Item	Qty	Qty	Part Number	Description
1	1	141	D212-664-141	CROSSTUBE ASSEMBLY (2058212612 REIN FWD)
2		X	D212-664-141B	CROSSTUBE ASSEMBLY (214 HIGH FWD)
3	1	1	D6005-128	CROSSTUBE
4	2	2	D2693-1	SUPPORT
5	4	4	D3595-063-450	RUBBER CUSHION
6	4	4	MS21920-25	CLAMP (OR MS21920-26)
7	A/R	A/R	MAGNOBOND 6398	ROCKWELL SPECIFICATION RBD-120-023 ADHESIVE (TEXTRON/SELL SPEC 292-947-100, TYPE II, CLASS 2 ADHESIVE)

GENERAL NOTES:

- 1) MATERIAL: MANUFACTURED FROM D6005-128
FINISHED LENGTH = 126.514±0.020
- 2) FINISH: CHEMICAL CONVERSION COAT PER DART QSI 005 4.1
PRIME INSIDE AND OUTSIDE PER DART QSI 005 4.2
PAINT OUTSIDE PER DART QSI 005 4.2
- 3) TOLERANCES ARE PER DART QSI 016 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED.
- 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX.
- 6) IDENTIFICATION: SCRIBE DART PART NUMBER "D212-664-XXX" AND BATCH NUMBER ON INSIDE OF CUFF
USING VIBRATING STYLUS
- 7) WEIGHT: D212-664-141 = 33.6 lbs (PER IIN-D212-664)
D212-664-141B = 33.6 lbs (PER IIN-D212-664)
- 8) PART IS SYMMETRIC ABOUT CENTERLINE.
- 9) RUN CUTTER OFF PART. BLEND OUT EDGE LONGITUDINALLY, TRANSITION SHOULD BE SMOOTH.
- 10) BEND PROGRESSIVELY WITH A MINIMUM OF 3 PASSES. MAXIMUM TUBE FLATTENING DUE TO BENDING IS 6% BASED ON O.D.
- 11) LIQUID PENETRANT INSPECT OUTSIDE SURFACE OF CROSSTUBE PER QSI 036.
- 12) INSTALL D2693-1 SUPPORT USING 0.03" TO 0.06" THICK LAYER OF MAGNOBOND 6398 TO THE SURFACE OF D2693-1 THAT WILL BE IN CONTACT WITH THE CROSSTUBE PER QSI 015. LET CURE FOR 12 HOURS AFTER INSTALLATION AND PRIOR TO PACKAGING.
- 13) INSTALL MS21920-25 CLAMPS (OR -26) WITH D3595-063-450 RUBBER CUSHIONS TO SECURE THE D2693-1 SUPPORT ON TOP SIDE OF THE CROSSTUBE. ENSURE CLAMPS ARE OPPOSITE OF CROSSTUBE SUPPORT.
- 14) EXTREME CARE MUST BE TAKEN TO PROTECT THE OUTSIDE SURFACE OF THE TUBE. THE OUTSIDE SURFACE MUST BE SMOOTH AND FREE FROM SURFACE DEFECTS SUCH AS SCRATCHES, NICKS, OR DENTS. DEFECTS UP TO 0.005" MAY BE BLENDED OUT LONGITUDINALLY. CIRCUMFERENTIAL GRIND MARKS ARE UNACCEPTABLE.
- 15) TORQUE CLAMPS 80 TO 100 IN-LB. ENSURE AT LEAST 1.5 THREADS SHOWING IN SAFETY AND THAT NUT HAS NOT BOTTOMED-OUT AFTER TORQUING.

SHOP COPY
RETURN TO
ENGINEERING
UNCONTROLLED COPY
SUBJECT TO AMENDMENT
WITHOUT NOTICE
WORK ORDER

NO. 55132
BT 10-1-06

RELEASED
2000-10-30

B	REFORMAT/REVISE GENERAL NOTES/PART LIST; REORGANIZED VIEWS AND REFORMATTED DRAWING TO CURRENT STANDARDS: ADD -141B (ZIN84-2,101-1); REMOVED REF & ADD TOLERANCES (ZIN 84-2, 05-3, Q8-8 & B8-8); RELOCATED FLAG #6 PER PAR 08-045 (ZIN 85-2); MOVED TURNING DETAIL & UPDATED TOLERANCE TO SHEET 4	RF	06.09.03
C	REMOVE -851 ABRASION STRIP, ADD MAGNOBOND 6398, CUSHION, REVERSE CLAMPS	PH	07.09.06
B	ADD HOLES FOR COMPATIBILITY WITH DART SKIDTUBES	PH	05.02.04
A	NEW ISSUE	PH	03.02.10
REV.	DESCRIPTION	REV.	DATE
DESIGN	<i>RF</i>	DART AEROSPACE LTD	
DRAWN	<i>RF</i>	90500-0000, ONTARIO, CANADA	
CHECKED	<i>RF</i>	REV. B	
MFG. APPR.	<i>RF</i>	D212-664-141	SHEET 1 OF 4
APPROVED	<i>RF</i>	TITLE	SCALE
DE APPR.	<i>RF</i>	XTUBE ASSY (2058212612 FWD)	1:25
DATE	09.09.30	COPYRIGHT © 2000 DART AEROSPACE LTD THE DOCUMENT CONTAINS TRADE SECRET INFORMATION OF DART AEROSPACE LTD NOT TO BE COPIED OR DISCLOSED WITHOUT THE EXPRESS WRITTEN CONSENT OF DART AEROSPACE LTD	

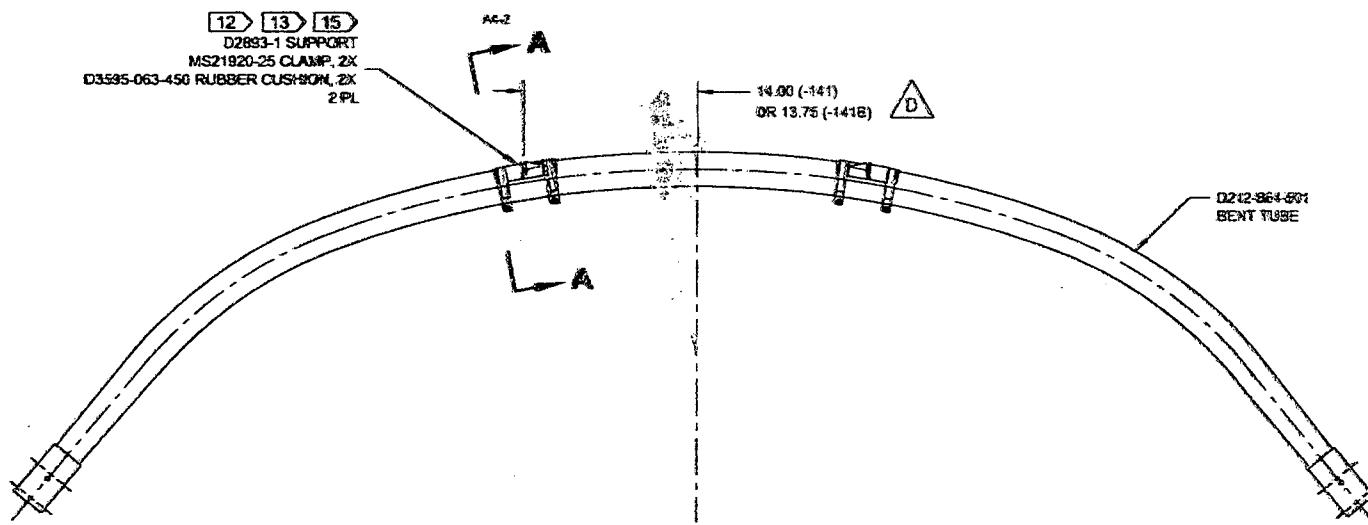
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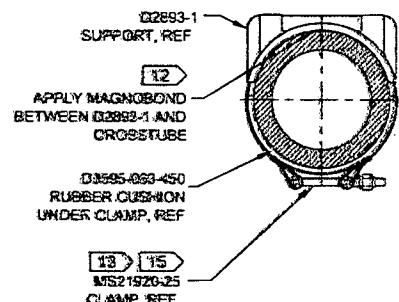
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D212-664-141/141B
ASSEMBLY DETAIL D



SECTION A-A DS-2
SCALE 4X

RELEASED
2009-10-29
W/ 55132

DESIGN	RF	DART AEROSPACE LTD
DRAWN	RF	WATERLOO, ONTARIO, CANADA
CHECKED	RF	REV. D
MFG. APPR.	RF	D212-664-141 SHEET 2 OF 4
APPROVED	RF	TITLE
DE APPR.	RF	SCALE
DATE	09.09.30	XTUBE ASSTY (205/212/412 HI FWD) NTS

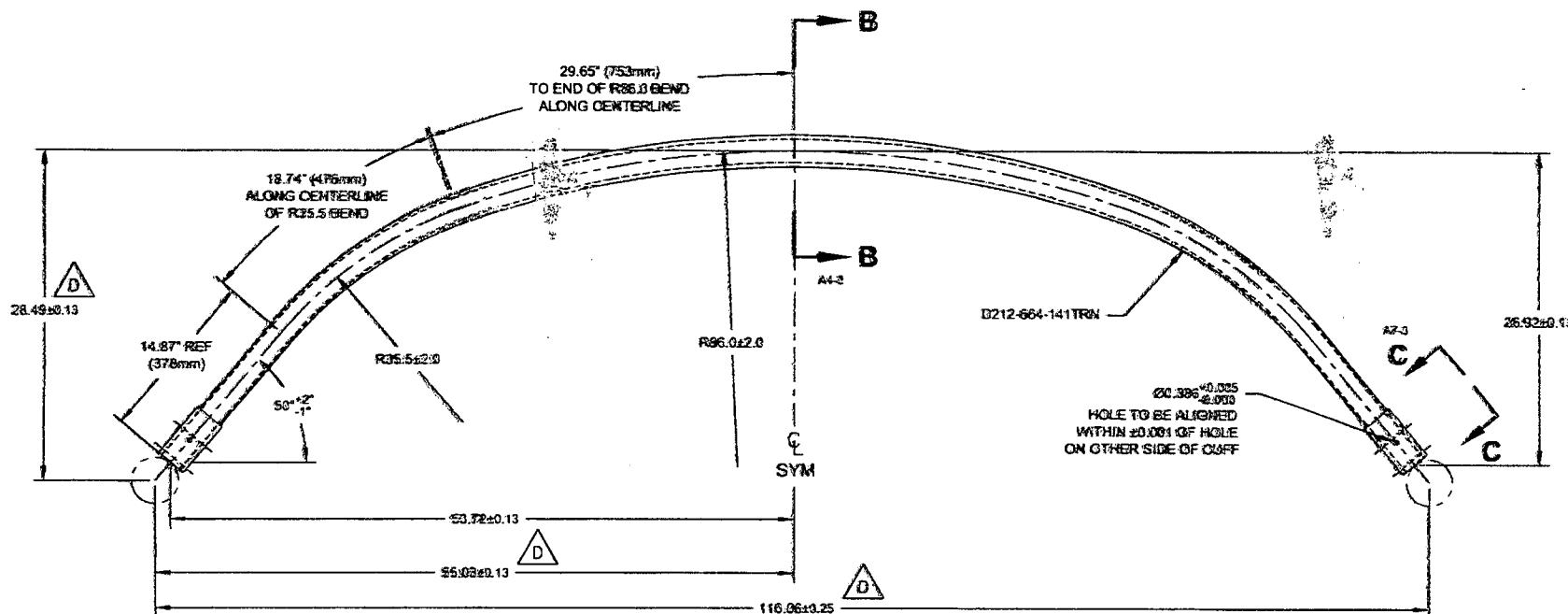
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W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

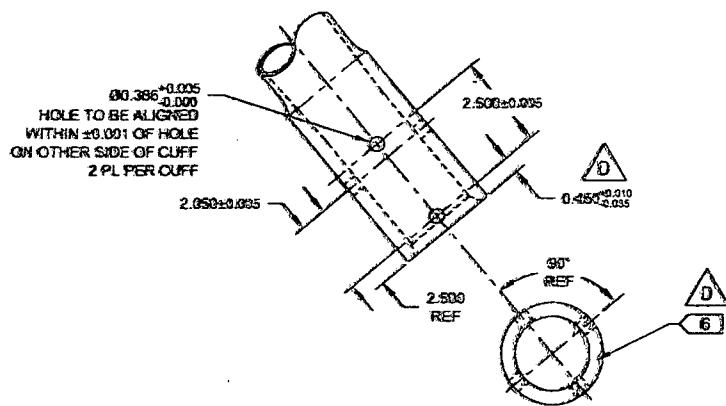
Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____
 Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

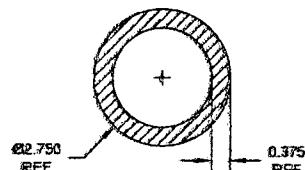
NOTE: Date & initial all entries



D212-664-501
SENDING AND DRILLING DETAIL



VIEW C-C: CURF DETAIL



SECTION B-B

14/05513.2

RELEASED
2024-11-29
JW

DESIGN	PH	DART AEROSPACE LTD	
DRAWN	RF	RAWMESBURY, ONTARIO, CANADA	
CHECKED	90	DRAWING NO.	REV. D
MFG. APPR.	DS	D212-684-141	SHEET 3 OF 4
APPROVED	100	TITLE	SCALE
DE APPR.	HT	XTUBE ASSY (205/212N 12 HI PWD)	NTS
DATE	09.09.30	DRAFTING AND DESIGN BY DART AEROSPACE LTD THIS DRAWING IS THE PROPERTY OF DART AEROSPACE LTD. IT MAY NOT BE COPIED OR DISSEMINATED WITHOUT THE WRITTEN CONSENT OF DART AEROSPACE LTD. IT MAY NOT BE USED FOR ANY PURPOSE OTHER THAN COMMERCIAL OR INTERNAL PRODUCT DESIGN.	

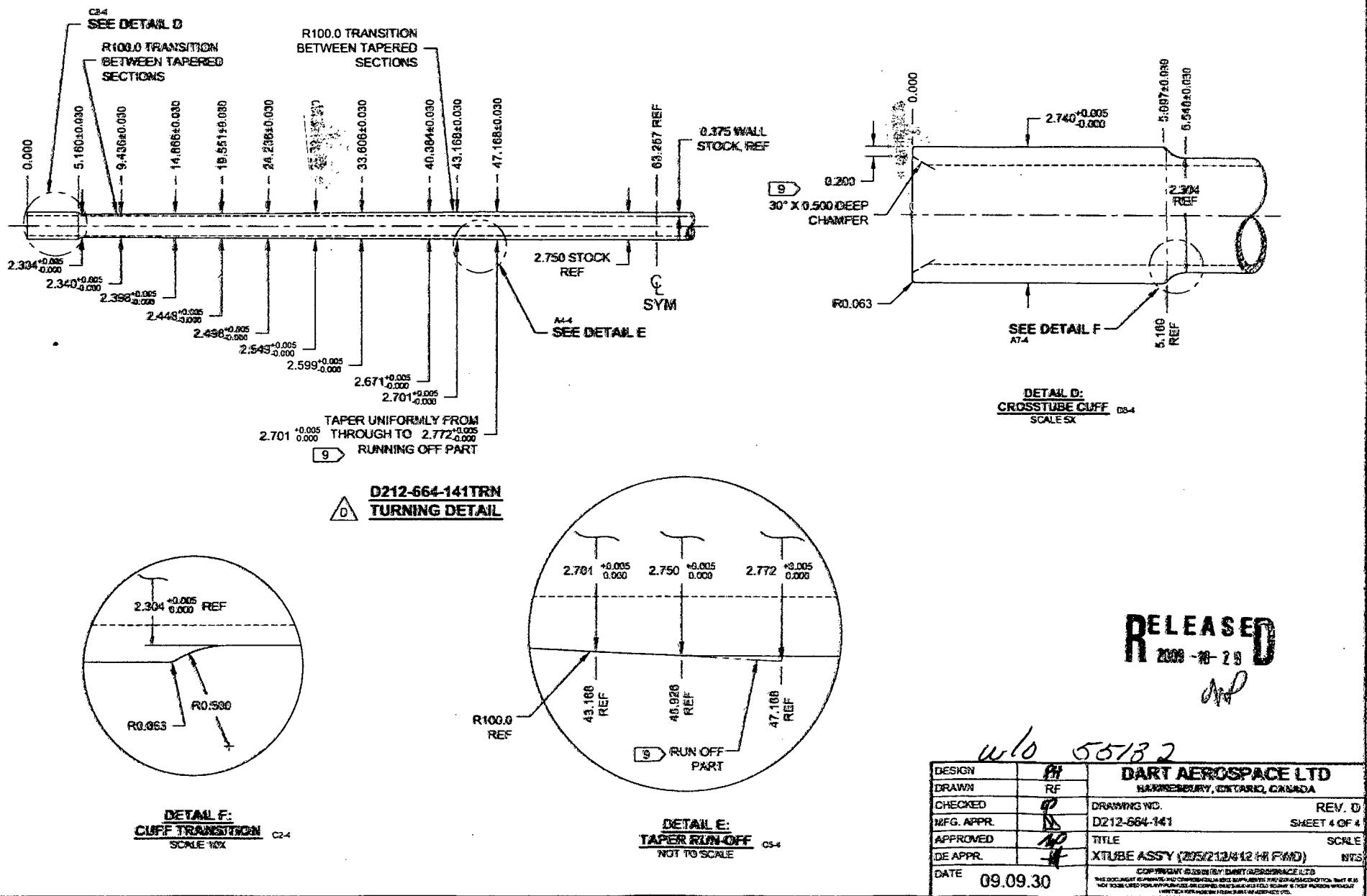
W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries



W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

5.0 PARTS LIST

5.1 HIGH GEAR CROSSTUBES

Item	-101	-201	-203	Part Number	Description
	X			D212-664-101	CROSSTUBE INSTALLATION, 204/205/210/212/214/412, UH-1H, UH-1A/B/E/F/L/P, TH-1F/L, HH-1K HIGH FWD
		X		D212-664-201	CROSSTUBE INSTALLATION, 204/205/210/212/214, UH-1H, UH-1A/B/E/F/L/P, TH-1F/L, HH-1K HIGH AFT
			X	D412-664-203	CROSSTUBE INSTALLATION, 412 HIGH AFT
1	1			D212-664-141	CROSSTUBE ASSEMBLY, 204/205/210/212/214/412, UH-1H, UH-1A/B/E/F/L/P, TH-1F/L, HH-1K HIGH FWD
2		1		D212-664-241	CROSSTUBE ASSEMBLY, 204/205/210/212/214, UH-1H, UH-1A/B/E/F/L/P, TH-1F/L, HH-1K HIGH AFT
3			1	D412-664-243	CROSSTUBE ASSEMBLY, 412 HIGH AFT
10	2			* D2893-1	SUPPORT
11	4			* D3595-063-450	RUBBER CUSHION
12	4			* MS21920-25	CLAMP (OR MS21042-26)
13	4			AN6-35A	BOLT
14	4			AN6-36A	BOLT
15	6			MS21042L6	NUT (OR MS21042-6)
16	18			AN960JD616	WASHER
20	2			* D2940-1	SUPPORT
21	4			* D3595-063-530	RUBBER CUSHION
22	4			* MS21920-28	CLAMP (OR MS21042-30)
23	4			AN6-40A	BOLT
24	2			AN6-41A	BOLT
25	6			MS21042L6	NUT (OR MS21042-6)
26	18			AN960JD616	WASHER
30		1		* D2896-1	SUPPORT
31		2		* D2856-600-1009	ABRASION STRIP
32		2		* D3595-063-570	RUBBER CUSHION
33		4		* MS21920-28	CLAMP
34		2		* MS21920-30	CLAMP (OR MS21042-32)
35		4		AN6-40A	BOLT
36		2		AN6-41A	BOLT
37		6		MS21042L6	NUT (OR MS21042-6)
38		18		AN960JD616	WASHER
39		2		* D3189-1	CHAFING SHIELD
50	1	1		/D3428-1	PLACARD

*REFERENCE ONLY. PARTS ARE INCLUDED IN D212-664-141/-241 OR D412-664-243 ASSEMBLIES ABOVE
 NOTE: KITS INCLUDE EXTRA HARDWARE FOR COMPATIBILITY WITH BOTH DART AND BELL/AA
 SKIDTUBES.

LIQUID PENETRANT TEST REPORT

P- 15316

CLIENT DAAT Aerospace PAGE 1 OF 1
 ATTENTION LINDA DATE FEB 1-2010
 ADDRESS 1270 ABERDEEN ST. TIME AM PM
HAWKESBURY ON.
K6H 1K7 ACUREN JOB NO. 183-10-0650
 PROJECT ASTM 1417 REV./DATE 2007
 ITEM(S) EXAMINED (12) SLEEVES (6) WORK LOCATION Hawkesbury -
F.P.T. ON CROSS TUBES. ACCEPTANCE STD. ASTM 1417 REV./DATE 2007

JOB DESCRIPTION PROCEDURE NO. LT-602 REV./DATE TECHNIQUE NO. LT-1442 REV./DATE
 PART NO. STAINLESS STEEL MATERIAL ALUMINUM THICKNESS —
 SCOPE WET FLUORESCENT LIQUID PENETRANT INSPECTION
CARRIED OUT 100% EXTERNAL

TEST DETAILS

METHOD <input checked="" type="checkbox"/> FLUORESCENT <input type="checkbox"/> VISIBLE	<input checked="" type="checkbox"/> WATER WASH <input type="checkbox"/> SOLVENT REMOVABLE <input type="checkbox"/> POST EMULSIFIED
FAMILY BRAND <u>MAGNAFLUX</u>	BLACK LIGHT S/N <u>16459</u> <input checked="" type="checkbox"/> OUTPUT > 1000 μ W/cm ² <input type="checkbox"/> AMBIENT < 2 fc
PENETRANT <u>2L 67</u>	MINIMUM DWELL TIME <u>45 10</u> MIN. <input type="checkbox"/> LIGHTING EQUIP. <input type="checkbox"/> FLASHLIGHT <input type="checkbox"/> TROUBLELIGHT <input type="checkbox"/> OUTPUT > 100 fc @ SURFACE
PENETRANT REMOVER <u>H2O</u>	MINIMUM DRY TIME <u>>10</u> MIN. <input type="checkbox"/> OTHER <u>LABNO</u>
DEVELOPER <u>SKD 152</u>	MINIMUM DWELL TIME <u>10</u> MIN. <input type="checkbox"/> LIGHT METER S/N <u>1078866</u> <input type="checkbox"/> CAL DUE DATE <u>MR 17, 2010</u>
DEVELOPER TYPE <input checked="" type="checkbox"/> NON AQUEOUS <input type="checkbox"/> AQUEOUS <input type="checkbox"/> DRY	

TEST SURFACE

SURFACE CONDITION <input type="checkbox"/> AS GROUND <input type="checkbox"/> AS WELDED <input type="checkbox"/> MACHINED <input type="checkbox"/> SHOT BLASTED <input type="checkbox"/> CLEAN BARE METAL
SURFACE TEMPERATURE <input type="checkbox"/> < -4°C/ 20°F <input type="checkbox"/> -4°C/ 20°F TO 10°C/50°F <input type="checkbox"/> 10°C/50°F TO 52°C/125°F <input type="checkbox"/> > 52°C/125°F
RESULTS- <input type="checkbox"/> METRIC <input checked="" type="checkbox"/> IMPERIAL

12 SLEEVES - W.O. 55-638
 1 Cross tube - W.O. 55132 ✓
 1 Cross tube - W.O. 55133 ✓
 1 Cross tube - W.O. 55406 ✓
 1 Cross tube - W.O. 55404 ✓
 20 Collective bell Clark - W.O. 53635 ✓
 1 Manif - W.O. 55097 ✓
 1 Cross tube - W.O. 55433 ✓
 1 Cross tube - W.O. 55434 ✓

ALL ITEMS EXAMINED ON THIS
 REPORT WERE FOUND ACCEPTABLE
 TO THIS STANDARD.

10/02/02

Scope of Services

The agreement of Acuren Group Inc. to perform services extends only to those services provided for in writing. Under no circumstances shall such services extend beyond the performance of the requested services. It is expressly understood that all descriptions, comments and expressions of opinion reflect the opinions or observations of Acuren Group Inc. based on information and assumptions supplied by the owner/operator and are not intended nor can they be construed as representations or warranties. Acuren Group Inc. is not assuming any responsibilities of the owner/operator and the owner/operator retains complete responsibility for the engineering, manufacture, repair and use decisions as a result of the data or other information provided by Acuren Group Inc. In no event shall Acuren Group Inc.'s liability in respect of the services referred to herein exceed the amount paid for such services.

Standard of Care
 In performing the services provided, Acuren Group Inc. uses the degree, care and skill ordinarily exercised under similar circumstances by others performing such services in the same or similar locality. No other warranty, expressed or implied, is made or intended by Acuren Group Inc.

SIGNATURES

CLIENT REPRESENTATIVE	<u>Matthew Murch</u> PRINT	<u>Matthew Murch</u> SIGNATURE	DTR # <u>E-27697</u>
TECHNICIAN (SIGNATURE):	<u>MIKE JEANS</u> PRINT		REPORT REVIEWED BY:
NAME (PRINT):			NAME <u> </u> INITIALS <u> </u>
CGSB LEVEL	<u>1</u> SNT LEVEL <u>1</u>	2 nd TECHNICIAN	
CGSB REG. NO.	<u>6606</u>	CGSB LEVEL	SNT LEVEL
		CGSB REG. NO.	